

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 2

1. (Original) A method for associating at least one medical device with a controller that is remote from the medical device, the method comprising the steps of:
providing a device identifier that indicates a device address of the medical device within a communication network;
providing a data collector;
obtaining the device address via the data collector;
transferring the device address from the data collector to the controller; and
associating the controller with the medical device so that the controller can communicate with the medical device.

2. (Original) The method of claim 1 wherein the obtaining and transferring steps are via wireless communication.

3. (Original) The method of claim 2 further including the steps of, after associating, causing the controller to send a first wireless communication to the device address and receiving the first wireless communication at the medical device.

4. (Original) The method of claim 3 wherein the step of sending the first communication includes the step of transmitting a controller address of the controller within the communication network.

5. (Original) The method of claim 3 further including the step of, in response to the first wireless communication, causing the medical device to perform a safety function.

6. (Original) The method of claim 5 wherein the medical device includes an indicator and the safety function includes activating the indicator.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 3

7. (Original) The method of claim 5 wherein the medical device includes a transmitter and the safety function includes causing the medical device to transmit a second wireless communication responsive to the first communication.

8. (Original) The method of claim 7 wherein the second wireless communication includes the status of the medical device.

9. (Original) The method of claim 7 wherein the second communication is transmitted to the controller.

10. (Original) The method of claim 5 further including the steps of storing a first patient information set in the medical device indicating information related to a patient for which the medical device has been provided and storing a second patient information set in the controller indicating information related to a patient and wherein the step of causing the controller to send a first wireless communication includes the step of transmitting the second patient information set to the device address, the step of receiving includes receiving the first patient information subset at the medical device and wherein the step of causing the device to perform a first safety function includes comparing the first and second patient information sets.

11. (Original) The method of claim 10 further including the step of providing an indicator on the medical device and wherein the step of causing the device to perform the safety function further includes the step of, when the first and second patient information sets are different, activating the indicator.

12. (Original) The method of claim 10 wherein the step of storing the first patient information set on the medical device includes the step of storing the first patient information set on an information device, the information device being one of a medication delivery container, a patient mounted device and a physician's computing device, establishing a communication link between the information device and the medical device and transferring the first patient information set from the information device to the medical device.

13. (Original) The method of claim 12 wherein the information device is an IV bag.

14. (Original) The method of claim 10 wherein the step of storing the first patient information set on the medical device includes the step of providing a medical device interface and entering the first patient information set via the interface device.

15. (Original) The method of claim 10 wherein each of the medical device and the controller are system devices, the method further includes the step of providing at least a third system device and wherein the step of storing the second patient information set on the controller includes the step of storing the second patient information set on the third system device, establishing a communication link between the third system device and the controller and transferring the second patient information set from the third system device to the controller.

16. (Original) The method of claim 15 wherein the step of providing the third system device includes the step of providing a patient mounted device.

17. (Original) The method of claim 16 wherein the step of providing a patient mounted device includes providing a wrist band.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 5

18. (Original) The method of claim 10 wherein the step of storing the second patient information set on the controller includes the step of providing a controller interface and entering the second patient information set via the interface device.

19. (Original) The method of claim 7 further including the steps of storing a first patient information set in the medical device indicating information related to a patient for which the medical device has been provided and storing a second patient information set in the controller indicating information related to a patient and wherein the step of causing the device to perform a safety function includes the steps of transferring a second wireless communication to the controller including the first patient information set and comparing the first and second patient information sets.

20. (Original) The method of claim 19 further including the step of providing an indicator on the medical device and wherein the step of causing the device to perform the safety function further includes the step of, when the first and second patient information sets are different, activating the indicator.

21. (Original) The method of claim 1 wherein the medical device is an infusion pump.

22. (Original) The method of claim 2 further including the steps of, after associating, causing the controller and medical device to perform a health safety function.

23. (Original) The method of claim 22 further including the steps of storing a first patient information set in the medical device indicating information related to a patient for which the medical device has been provided and storing a second patient information set in the controller indicating information related to a patient, the medical device and controller each being system devices and the first and second patient information sets each being identifying information sets and, wherein, the step of performing a health safety function further includes the steps of causing a first of the system devices to transmit a first of the identifying information sets to a second of the system devices, receiving the first identifying information set at the second system device and comparing the first and second identifying information sets.

24. (Original) The method of claim 23 further including the step of providing an indicator linkable to the second of the system devices and wherein the step of performing a health safety function further includes the step of, where the first and second identifying sets are different, activating the indicator.

- 25. (Canceled)
- 26. (Canceled)
- 27. (Canceled)
- 28. (Canceled)
- 29. (Canceled)
- 30. (Canceled)
- 31. (Canceled)
- 32. (Canceled)
- 33. (Canceled)
- 34. (Canceled)
- 35. (Canceled)
- 36. (Canceled)
- 37. (Canceled)
- 38. (Canceled)
- 39. (Canceled)
- 40. (Canceled)
- 41. (Canceled)
- 42. (Canceled)

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 7

43. (Canceled)
44. (Canceled)
45. (Canceled)
46. (Canceled)
47. (Canceled)
48. (Canceled)
49. (Canceled)
50. (Canceled)
51. (Canceled)
52. (Canceled)
53. (Canceled)
54. (Canceled)
55. (Canceled)
56. (Canceled)
57. (Canceled)
58. (Canceled)
59. (Canceled)
60. (Canceled)
61. (Canceled)
62. (Canceled)
63. (Canceled)
64. (Canceled)
65. (Canceled)
66. (Canceled)
67. (Canceled)
68. (Canceled)
69. (Canceled)
70. (Canceled)
71. (Canceled)
72. (Canceled)
73. (Canceled)
74. (Canceled)
75. (Canceled)
76. (Canceled)
77. (Canceled)
78. (Canceled)
79. (Canceled)
80. (Canceled)
81. (Canceled)
82. (Canceled)
83. (Canceled)

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 8

- 84. (Canceled)
- 85. (Canceled)
- 86. (Canceled)
- 87. (Canceled)
- 88. (Canceled)
- 89. (Canceled)
- 90. (Canceled)
- 91. (Canceled)
- 92. (Canceled)
- 93. (Canceled)
- 94. (Canceled)
- 95. (Canceled)
- 96. (Canceled)
- 97. (Canceled)
- 98. (Canceled)
- 99. (Canceled)
- 100. (Canceled)
- 101. (Canceled)
- 102. (Canceled)
- 103. (Canceled)
- 104. (Canceled)
- 105. (Canceled)
- 106. (Canceled)
- 107. (Canceled)
- 108. (Canceled)
- 109. (Canceled)
- 110. (Canceled)
- 111. (Canceled)
- 112. (Canceled)
- 113. (Canceled)
- 114. (Canceled)
- 115. (Canceled)
- 116. (Canceled)
- 117. (Canceled)
- 118. (Canceled)
- 119. (Canceled)
- 120. (Canceled)
- 121. (Canceled)
- 122. (Canceled)
- 123. (Canceled)
- 124. (Canceled)

Carlos De La Huerga
Serial No.: 10/004,941

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 9

- 125. (Canceled)
- 126. (Canceled)
- 127. (Canceled)
- 128. (Canceled)
- 129. (Canceled)
- 130. (Canceled)
- 131. (Canceled)
- 132. (Canceled)
- 133. (Canceled)
- 134. (Canceled)
- 135. (Canceled)
- 136. (Canceled)
- 137. (Canceled)
- 138. (Canceled)
- 139. (Canceled)
- 140. (Canceled)
- 141. (Canceled)
- 142. (Canceled)
- 143. (Canceled)
- 144. (Canceled)
- 145. (Canceled)
- 146. (Canceled)
- 147. (Canceled)
- 148. (Canceled)
- 149. (Canceled)
- 150. (Canceled)
- 151. (Canceled)

152. (Original) A method for controlling an infusion pump assembly comprising the steps of:

providing a blood type database indicating medications that should not be taken by persons with specific blood types;

providing at least one IV bag including an information device that indicates medication information including the medication included in the IV bag;

obtaining medication information from the information device;

providing at least one patient identification device including information identifying a specific patient;

obtaining the patient identifying information from the patient identification device;

accessing the blood type database and identifying all medications that the patient should not take; and

determining if the medication in the IV bag is administrable to the patient.

153. (Original) The method of claim 152 further including the step of, when the medication is administrable to the patient, activating the pump.

154. (Canceled)

155. (Canceled)

156. (Canceled)

157. (Canceled)

158. (Canceled)

159. (Canceled)

160. (Canceled)

161. (Canceled)

162. (Canceled)

163. (Canceled)

164. (Canceled)

165. (Canceled)

166. (Canceled)

167. (Canceled)

168. (Canceled)

169. (Canceled)

170. (Canceled)

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 11

- 171. (Canceled)
- 172. (Canceled)
- 173. (Canceled)
- 174. (Canceled)
- 175. (Canceled)
- 176. (Canceled)
- 177. (Canceled)
- 178. (Canceled)
- 179. (Canceled)
- 180. (Canceled)
- 181. (Canceled)
- 182. (Canceled)
- 183. (Canceled)
- 185. (Canceled)
- 186. (Canceled)
- 187. (Canceled)
- 188. (Canceled)
- 189. (Canceled)
- 190. (Canceled)
- 191. (Canceled)
- 192. (Canceled)

193. (Original) The method of claim 1 wherein the obtaining step includes reading a bar code on the medical device and the transferring step includes wirelessly transferring the device address.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 12

194. (Original) The method of claim 1 further including the steps of obtaining at least one of medication information from a medication container, patient information from a patient identification device and physician identification from a physician identification device, the method further including at least two of:

identifying the time at which the address information is obtained;

identifying the time at which the medication information is obtained from the medication container;

identifying the time at which the patient information is obtained from the patient identification device;

identifying the time at which the physician identification is obtained from the physician identification device;

identifying a prescribed time indicating the time prescribed for delivery of the medication to a patient;

identifying an authorize activation time indicating when a device has been authorized to deliver a medication to a patient; and

identifying a delivery activation time indicating when an activation command has been received to deliver a medication to a patient via the device;

the method further including the step of comparing at least two of the identified times and when the duration between the compared times exceeds a threshold period, performing a health safety function.

195. (Original) The method of claim 194 wherein the step of identifying at least two of the times includes identifying at least three of the times, the step of comparing including determining when the duration between the at least three times exceeds the threshold period, the health safety function performed when the duration between the compared times exceeds the threshold period.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 13

196. (Original) The method of claim 194 wherein the step of identifying at least two of the times includes identifying at least four of the times, the step of comparing including determining when the duration between the at least four times exceeds the threshold period, the health safety function performed when the duration between the compared times exceeds the threshold period.

197. (Original) The method of claim 194 wherein the each of the step of obtaining the medical device address and the step of obtaining at least one of the medication information, the patient information and the physician information include reading a machine readable label.

198. (Original) The method of claim 194 wherein the step of obtaining at least one of medication information from a medication container, patient information from a patient identification device and physician identification from a physician identification device includes obtaining the information using the data collector, the method further including transferring the obtained information to the controller.

199. (Original) The method of claim 198 wherein the step of identifying at least two times includes identifying the at least two times using the data collector, the method further including the step of transferring the at least two times to the controller.

199. (Original) The method of claim 194 wherein the step of performing a health safety function includes activating an indicator at one of the data collector, the medical device, and the controller.

200. (Original) The method of claim 194 wherein the step of performing a health safety function includes one of the data collector and the controller transmitting a signal to the medical device to disable the medical device.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 14

201. (Original) The method of claim 1 further including the steps of obtaining patient identification information indicating a patient that is to be associated with the controller, associating the controller with the patient identification information, providing medication information on a medication container, obtaining the medication information from a medication container, using the medication information to determine specific patient information for whom the medication was dispensed, comparing the patient identification information indicating the patient that is associated with the controller and the specific patient identification information and determining that the patient identification information indicating the patient that is associated with the controller is different than the specific patient identification information and activating an indicator.

202. (Original) The method of claim 3 further including the step of using the medical device address to send the first wireless communication.

203. (Original) The method of claim 2 further including the steps of, after the step of associating the one medical device with the controller, communicating wherein the medical device wirelessly transmits information to the controller.

204. (Original) The method of claim 203 further including the steps of providing at least a second medical device that is not associated with the controller wherein, when any medical device transmits information that is received by the controller, the controller determines if the controller is associated with the transmitting device and wherein the controller only uses received information from associated medical devices and ignores received information from devices that are not affiliated with the controller.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 15

205. (Original) The method of claim 2 wherein the medical device is a first medical device and the first medical device address is a first medical device address, the method further including the steps of providing a first indicator that is associated with the first medical device, providing a second medical device with a second device address and a second indicator, obtaining the second device address via the data collector; transferring the second device address from the data collector to the controller and associating the controller with the second medical device so that the controller can communicate with the second medical device, using the controller to select information related to the first medical device and using the first medical device address to send a signal to the first medical device, receiving the signal by the first medical device and using the signal to activate the first indicator.

206. (Original) The method of claim 1 wherein the at least one medical device includes an infusion pump, the method further including the steps of transmitting a signal from the infusion pump to the controller indicating that the infusion pump is no longer operative and, when the signal is received at the controller, disassociating the controller from the infusion pump.

207. (Original) The method of claim 206 further including the steps of, prior to transmitting the signal from the infusion pump to the controller indicating that the infusion pump is no longer operative, determining that a infusion pump line is no longer connected to the infusion pump, the step of transmitting the signal from the infusion pump including transmitting the signal when the line is disconnected from the infusion pump.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 16

208. (Original) The method of claim 2 wherein the medical device is a first medical device and the device address is a first medical device address, the method further including the steps of providing a patient identifier that includes patient identifying information, using the data collector to obtain the patient identifying information from the patient identifier and transmitting the patient identifying information to the controller.

209. (Original) The method of claim 208 further including the steps of providing at least a first medication container that includes medication information associated with a medication in the first medication container, the medication information including specific patient information indicating the patient for whom medication in the container is prescribed, obtaining at least a subset of the medication information from the first medication container using the data collector and transmitting the at least a subset of the medication information to the controller.

210. (Original) The method of claim 209 further including the steps of using the medication information transmitted to the controller to identify specific patient information indicating the patient for whom the medication in the first medication container has been prescribed, comparing the patient identifying information from the patient identifier and the specific patient information and when the compared information is different, activating an indicator.

211. (Original) The method of claim 210 wherein the step of using the medication information transmitted to the controller to identify specific patient information includes the step of transferring the medication information from the controller to a remote computer and locating the specific patient identification information by the remote computer in a medication database.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 17

212. (Original) The method of claim 1 including the steps of providing a medication container with a medication identifier containing medication information, using the data collector to obtain the medication information from the medication identifier, transmitting the medication information from the data collector to the controller and using the medication information to control the medical device.

213. (Original) The method of claim 212 wherein the step of using the medication information to control the medical device includes the steps of the controller transferring the medication information to a medication database, using the medication information to identify medication control information in the database, providing the medication control information to the controller and the controller using the medication control information to control the medical device.

214. (Original) The method of 1 wherein the medical device includes a infusion pump that includes at least first and second pump assemblies and where the device address is a first device address associated with the first pump assembly, the method further including the steps of providing a second device address for the second pump assembly, obtaining the second device address using the data collector, transmitting the second device address to the controller and the controller monitoring operation of the first and second pump assemblies.

215. (Original) The method of claim 214 further including the steps of obtaining with the data collector first and second medication information from first and second medication labels associated with first and second infusion bags containing first and second medications and transferring the first and second medication information to the controller and determining that the first and second medications can be used together.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 18

216. (Original) The method of claim 215 wherein the step of determining that the first and second medications can be used together includes determining they are for the same patient.

217. (Original) The method of claim 1 further including the step of associating the controller with a patient.

218. (Original) The method of claim 53 wherein the steps of providing the first and second IV bags includes the step of dispensing the same medication in the first and second IV bags.

219. (Original) The method of claim 1 further including the steps of identifying at least two times when data obtaining events occur, comparing the data obtaining times and when the duration between data obtaining times for the events exceeds a threshold period, performing a health safety function.

RESPONSE TO RESTRICTION REQUIREMENT AND AMENDMENT

Page 19

220. (Original) The method of claim 219 further including the step of obtaining at least one of medication information from a medication container, patient information from a patient identification device and physician identification from a physician identification device, the step of identifying at least two times including identifying at least two of:

- the time at which the address information is obtained;

- the time at which the medication information is obtained from the medication container;

- the time at which the patient information is obtained from the patient identification device;

- the time at which the physician identification is obtained from the physician identification device;

- a prescribed time indicating the time prescribed for delivery of the medication to a patient;

- an authorize activation time indicating when a device has been authorized to deliver a medication to a patient; and

- a delivery activation time indicating when an activation command has been received to deliver a medication to a patient via the device.